

**Fw: Bee kill**

**Thomas Steeger** to: Norman Spurling

05/16/2012 07:32 AM

Please see the revised incident report from [REDACTED]

----- Forwarded by Thomas Steeger/DC/USEPA/US on 05/16/2012 07:29 AM -----

From: [REDACTED]  
To: Thomas Steeger/DC/USEPA/US@EPA  
Date: 05/15/2012 09:04 PM  
Subject: Re: Bee kill

Goodevaning

I made a few minor changes and sent a corn bag label in the attachment.

Bill

----- Original Message -----

**From:** Thomas Steeger

**To:** [REDACTED]

**Sent:** Tuesday, May 15, 2012 7:29 PM

**Subject:** Re: Bee kill

Dear [REDACTED]

Thank you for taking the time to speak with me today regarding your loss of bees. As I indicated over the phone, the information you provided will be entered into the U.S. Environmental Protection Agency Office of Pesticide Programs' (OPP) Incident Data System (IDS) and into the Ecological Incident Information System (EIIIS). The EIIIS is maintained by the Division in which I work, *i.e.*, the Environmental Fate and Effects Division. Risk assessors within OPP make use of both databases as lines of evidence in determining the potential effects of pesticides; these reports are very useful toward understanding how chemicals may impact the environment under their actual use conditions.

I am providing a summary of what we discussed relative to your recent beekill. I request that you review the information and let me know if there are any inaccuracies or whether you have any additional information. Based on our discussion, you indicated that on April 8, a fellow beekeeper who is located 3 miles south of your location noticed that his bee were dying; at that time, corn had just been planted in the vicinity of the affected colonies. You are located in the vicinity of Hensall, Ontario [Canada, and on April 12, the field immediately adjacent to your home yard was planted with corn by the same grower, who planted the fields 3 miles south of your location. On April 12, the grower began planting early in the morning (8 AM) to help reduce the potential for dust/drift. This was the first year the field had been planted in corn. In previous years, the field had been planted in soybeans/alfalfa. It had recently rained and the field was wet; additionally, there was a frost that morning and the air temperature during planting was 2°C [so bees would not have been foraging].

The grower used a John Deere air seeder with booms which stretched roughly 40 - 50 ft across, and he was planting a combination of Pioneer and Dekalb seed treated with clothianidin and two fungicides. During the seeding operation, you did not notice any dust being emitted [since the field was wet from previous rains]. To your recollection, there was only a slight breeze while the field was being planted. It took roughly 1.5 hours to plant the field and within 1.5 hours of when the grower completed the seeding operation, you noticed that bees were starting to die at the entrances of your colonies. Based on your observations, you believe that whatever killed your bees moved toward and inside the colonies rather

\*Personal privacy information\*

than being carried there by bees since bees were not foraging prior to or at the time the beekill was first observed.

You have a total of 350 colonies spread over 5 yards and approximately 200 - 300 colonies are exhibiting some degree of bee mortality. The highest mortality was observed in your home yard which is approximately 75 ft from the corn field. This yard consists of 105 colonies and adult bee numbers have decreased by roughly 40% in this yard which is used to breed Buckfast queens. This has effectively prevented the colonies from being split because there are too few bees left in the colonies. Except for one colony where a dead queen was found outside the colony; all of the other colonies have been queen right; however, they have a spotty brood pattern since the initial beekill.

At the time of the initial beekill tree bloom had subsided and no dandelions were available in the adjacent field; therefore, the bees would not have likely been foraging in the field especially given the cold temperatures as well. In March you had provided the colonies with supplemental protein (pollen substitute); however, you have not fed them since that time. Ontario had a mild winter and winter loss was relatively low (<10%) this year,

You produce honey and you breed queens (Buckfast) for Canadian and U.S. beekeepers; you also produce nucleus colonies. Given the change in the agricultural profile in your area, there isn't much opportunity to offer pollination services.

Disease and parasite (varroa mite) loads have been low; you rely on Apistan (fluvalinate) to control mites. You indicated that fluvalinate is effective provided that sufficient time (3 - 4 years) is allotted between treatments so that resistance can be avoided.

The Ministry of the Environment collected samples for pesticide residue analyses and the Ontario Beekeepers Association is collecting samples for colony health monitoring. You have dead zone dead bee traps positioned in front of your home yard colonies and you are continuing to collect samples and take pictures. Bees have continued to die in the affected colonies.

Once again, I would like to thank you for providing this information to the EPA Office of Pesticide Programs. I request that if you receive any additional information regarding the loss of your colonies that you relay that information to me so that it can be included in the incident report.

Sincerely,

Tom Steeger

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Thomas Steeger, Ph.D.  
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---05/15/2012 11:40:05 AM---Hello You were talking to Davis Bryans yesterday and said you would like to talk to the one who

From: [REDACTED]  
To: Thomas Steeger/DC/USEPA/US@EPA  
Date: 05/15/2012 11:40 AM  
Subject: Bee kill

Hello

You were talking to Davis Bryans yesterday and said you would like to talk to the one who found the dead Robin. We are still having bee die off since the first when we were hit on April 12.

You can contact me

[REDACTED]  
Hensall Ontario  
[REDACTED]  
[REDACTED]



Corn seed table.wpd



\*Personal privacy information\*

**Fw: 9 pictures for you**

**Thomas Steeger** to: Norman Spurling

05/15/2012 07:34 PM

Cc: [REDACTED]

[REDACTED] just forwarded these pictures to support his recent beekill incident report which I just forwarded to you.

— Forwarded by Thomas Steeger/DC/USEPA/US on 05/15/2012 07:33 PM —

From: [REDACTED]  
To: Thomas Steeger/DC/USEPA/US@EPA  
Date: 05/15/2012 05:20 PM  
Subject: 9 pictures for you

Hi Tom Steeger

I have sent some pictures and I hope this gives some indication of the situation. The die of is a 24 hour period in the pictures. The brood shows the kill off of the larva.





Bill

You have been sent 9 pictures.

CIMG0099.JPG  
CIMG0114.JPG  
CIMG0157.JPG  
CIMG0214.JPG  
CIMG0191.JPG  
CIMG0181.JPG  
CIMG0088.JPG  
CIMG0087.JPG  
CIMG0142.JPG

These pictures were sent with Picasa, from Google.

[REDACTED]  
Hensall Ontario  
[REDACTED]

Try it out here: <http://picasa.google.com/>    

      
CIMG0191.JPG CIMG0181.JPG CIMG0088.JPG CIMG0087.JPG CIMG0142.JPG